

Land Surveying

FACULTY

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<http://www.bates.ctc.edu/LandSurveying>

Students prepare for careers as surveying technicians, using equipment and software that is standard in the industry. Classroom and laboratory settings closely resemble a small surveying firm to provide students with practice in all aspects of projects common to the profession, including project definition, document research, computations, CAD drawing, field work (preliminary to final staking), and client presentations. This program also provides extended learning opportunities for people previously or currently employed in related occupations.

Associate of Technology Degree: 102 credits

Land Surveying

Completion Range: 15-23 Months

	<u>Credits/Hours</u>
LSUR 091 Occupational Human Relations	3/50
LSUR 092 Occupational Communication	6/100
LSUR 093 Occupational Math Principals	6/100
ECMPT 101 Computers as an Engineering Tool	4/65
LSUR 104 Surveying Mathematics I	6/100
LSUR 105 Surveying Mathematics II	6/100
LSUR 106 Surveying Mathematics III	6/100
LSUR 111 Basic Survey Drafting	4/70
LSUR 121 Levels as a Surveying Tool	3/50
LSUR 131 Transits as a Surveying Tool	7/115
LSUR 132 Intermediate Field Surveying	9/150
LSUR 140 Intermediate Survey Drafting	6/100
LSUR 201 Legal Descriptions and Position Tolerance	5/83
LSUR 211 Advanced Field Surveying	7/117
LSUR 221 Subdivision Planning and Design	7/117
LSUR 231 Roadway Design	6/100
LSUR 241 Independent Projects	7/120
LSUR 251 Remote Sensing (Photogrammetry)	4/70
LSUR 261 Global Positioning	7/115
LSUR 271 Geographic Information Systems (GIS)	4/70

General Education Requirements

	<u>Credits</u>
100-level or> Human Relations – HREL, PSYCH, SOC or CMST	5
100-level or> Communications – ENGL or CMST	5
100-level or> Mathematics – MATH	5

Certificate of Competency: 69 credits

Surveyor's Aide

Completion Range: 10-18 Months

	<u>Credits/Hours</u>
LSUR 091 Occupational Human Relations	3/50
LSUR 092 Occupational Communication	6/100
LSUR 093 Occupational Math Principals	6/100
ECMPT 101 Computers as an Engineering Tool	4/65
LSUR 104 Surveying Mathematics I	6/100
LSUR 105 Surveying Mathematics II	6/100
LSUR 111 Basic Survey Drafting	4/70
LSUR 121 Levels as a Surveying Tool	3/50
LSUR 131 Transits as a Surveying Tool	7/115
LSUR 132 Intermediate Field Surveying	9/150
LSUR 140 Intermediate Survey Drafting	6/100

General Education Requirements

	<u>Credits</u>
90-level or> Human Relations – HREL, PSYCH, SOC or CMST	3
90-level or> Communications – ENGL or CMST	3
90-level or> Mathematics – MATH	3

90-level credit units apply toward meeting certificate requirements, but do not apply toward degree requirements.